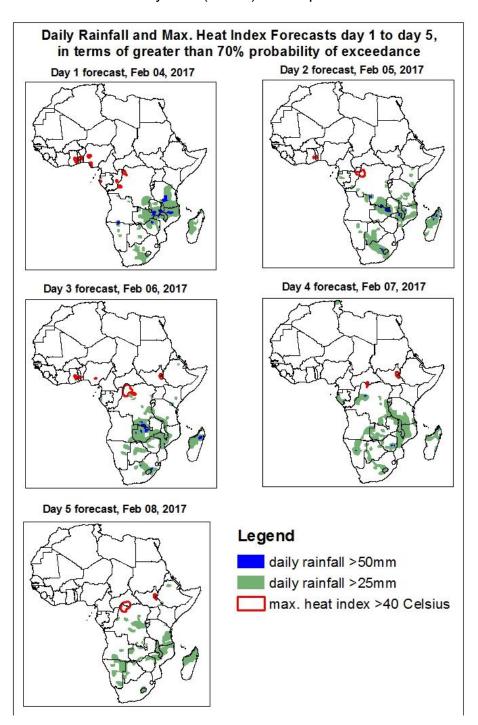
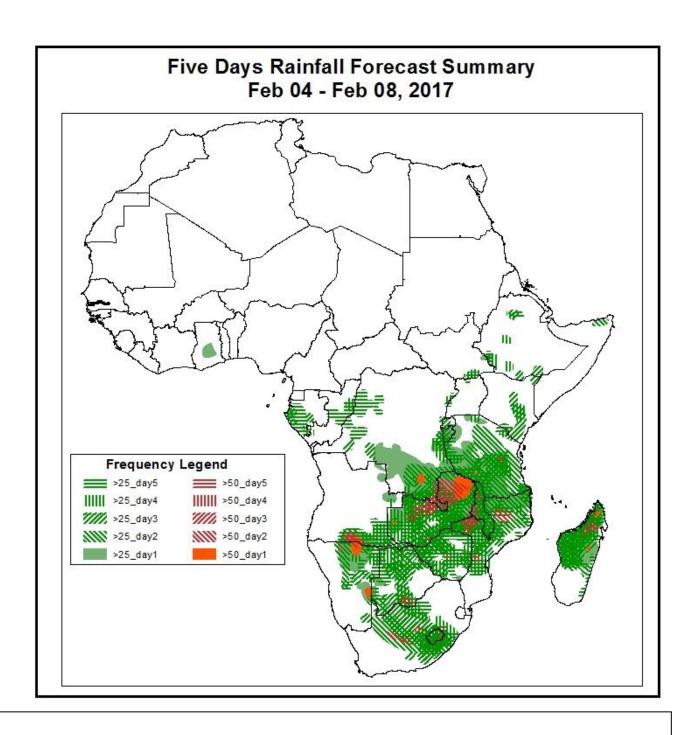
## 1. Rainfall, Heat Index and Dust Concentration Forecasts, (Issued on Feb 03, 2017)

### 1.1. Daily Rainfall and Maximum Heat Index Forecasts (valid: Feb 04– Feb 08, 2017)

The forecasts are expressed in terms of high probability of precipitation (POP) and high probability of maximum heat index, based on the NCEP/GFS, ECMWF and the NCEP Global Ensemble Forecasts System (GEFS) and expert assessment.



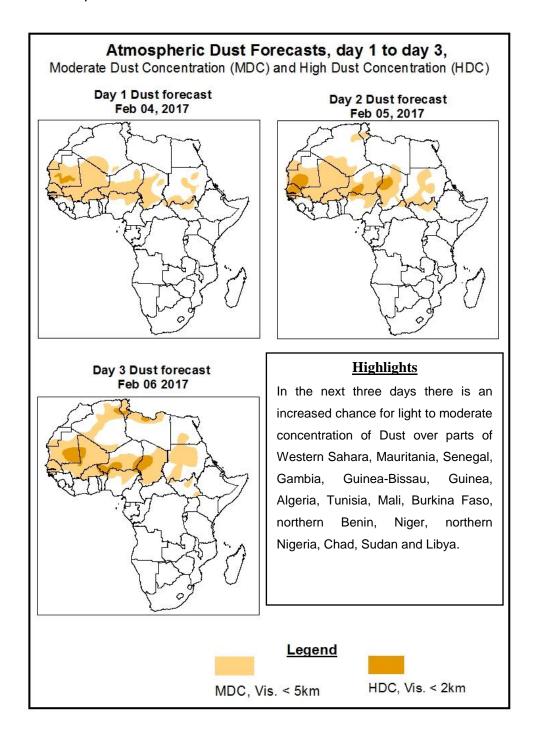


# **Highlights**

In the next five days, lower level wind convergences across the South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of light to moderate rainfall over portions of Burundi, Tanzania, Zambia, Malawi, Mozambique, Botswana, Zimbabwe, Lesotho and Madagascar, local areas of South Sudan, Ethiopia, Gabon, Congo, DRC, Kenya, Angola, Namibia and South Africa.

# 1.2. Atmospheric Dust Concentration Forecasts (valid: Feb 04 – Feb 06, 2017)

The forecasts are expressed in terms of high probability of dust concentration, based on the Navy Aerosol Analysis and Prediction System, NCEP/GFS lower-level wind forecasts and expert assessment.



#### **1.3. Model Discussion,** Valid: Feb 04 – Feb 08, 2017

The Azores High Pressure system over the North Atlantic Ocean is expected to intensify with its value of the central pressure increasing from 1028hPa to 1034hPa during the forecast period.

The St. Helena High Pressure system over the Southeast of the Atlantic Ocean is expected to weaken with its value of the central pressure decreasing from 1027hPa to 1022hPa during the forecast period.

The Mascarene High Pressure system over the Southwest Indian Ocean is expected to intensify with its value of the central pressure increasing from 1025hPa to 1032hPa in the next 48 hours, weaken to 1030hPa in the next 72 hours, intensify to 1031hPa in the next 96 hours, and later weaken to 1030hPa during the remaining forecast period.

At 925hPa, strong dry Northerly to Easterly winds may lead from light to moderate dust concentration over parts of Western Sahara, Mauritania, Senegal, Gambia, Guinea-Bissau, Guinea, Algeria, Tunisia, Mali, Burkina Faso, northern Benin, Niger, northern Nigeria, Chad, Sudan, Egypt and Libya.

At 850hPa level, lower level wind convergences are expected to prevail over Cameroon, CAR, Congo, DRC, Uganda, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe and South Africa.

In the next five days, lower level wind convergences across the South African countries are expected to enhance rainfall in their respective regions. Therefore, there is an increased chance for two or more days of light to moderate rainfall over portions of Burundi, Tanzania, Zambia, Malawi, Mozambique, Botswana, Zimbabwe, Lesotho and Madagascar, local areas of South Sudan, Ethiopia, Gabon, Congo, DRC, Kenya, Angola, Namibia and South Africa.

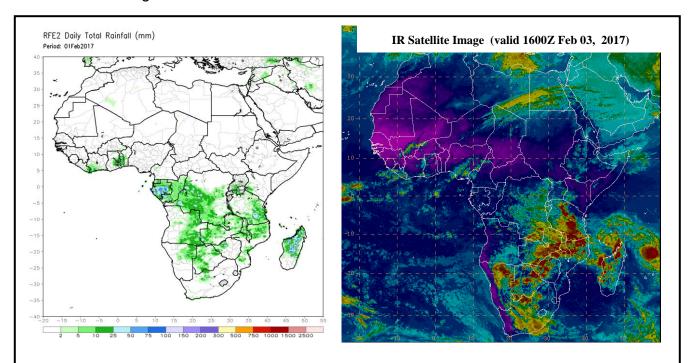
## 2.0. Previous and Current Day Weather over Africa

### 2.1. Weather assessment for the previous day (Feb 02, 2017)

Light to moderate rainfall was observed over portions of DRC, Burundi, Tanzania, Angola, Zambia, Mozambique, Namibia, Botswana, Zimbabwe, South Africa, and Madagascar.

## 2.2. Weather assessment for the current day (Feb 03, 2017)

Intense convective clouds are observed over portions of Liberia, Cote D'Ivoire, DRC, Tanzania, Angola, Zambia, Malawi, Mozambique, Namibia, Botswana, Zimbabwe, South Africa and Madagascar.



Previous day rainfall condition over Africa (Left) based on the NCEP CPCE/RFE and current day cloud cover (right) based on IR Satellite image.

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